



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

AN

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/082,363	02/25/2002	Phillip R. Sommer	IPHO/0005.06	2301

25223 7590 01/14/2004

WHITEFORD, TAYLOR & PRESTON, LLP
ATTN: GREGORY M STONE
SEVEN SAINT PAUL STREET
BALTIMORE, MD 21202-1626

EXAMINER

DOAN, JENNIFER

ART UNIT

PAPER NUMBER

2874

DATE MAILED: 01/14/2004

find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.	10/082,363	
Examiner	SOMMER ET AL.	
Jennifer Doan	Art Unit 2874	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) Responsive to communication(s) filed on _____.
2a) This action is FINAL. 2b) This action is non-final.
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) Claim(s) 1-31 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) Claim(s) 25-31 is/are allowed.
6) Claim(s) 1,4,10,12,14,15,17,18 and 23 is/are rejected.
7) Claim(s) 2,3,5-9,11,13,16,19-22 and 24 is/are objected to.
8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) The specification is objected to by the Examiner.
10) The drawing(s) filed on 25 February 2002 is/are: a) accepted or b) objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) All b) Some * c) None of:
1. Certified copies of the priority documents have been received.
2. Certified copies of the priority documents have been received in Application No. _____.
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
13) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
a) The translation of the foreign language provisional application has been received.
14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

1) Notice of References Cited (PTO-892) 4) Interview Summary (PTO-413) Paper No(s). _____.
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) Notice of Informal Patent Application (PTO-152)
3) Information Disclosure Statement(s) (PTO-1449) Paper No(s) 0203. 6) Other: _____.

DETAILED ACTION

This application is a continuation of 10/038,093, filed on January 4, 2002, now U.S. Patent 6,628,886.

Drawings

1. The drawings, filed on 02/25/2002, are accepted.

Specification

2. Applicants' cooperation is requested in correcting any errors of which applicants may become aware in the specification.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1, 10, 12, 18 and 23 are rejected under 35 U.S.C. 102(e) as being anticipated by Melton et al. (U.S. 2003/0044141).

Regarding claims 1, 12 and 18, Melton et al. disclose a method and an apparatus of an optical component attachment for attaching a plurality of optical components to a plurality of mating optical fibers comprising a step of positioning the plurality of the optical components and the plurality of mating optical fibers; wherein the component insertion tool is configured to insert a plurality of mating optical components to a plurality of mating fiber optic cables held in a processing position relative the longitudinal axis of the mating optical components (see [0019] lines 10-23 and [0021] lines 1-4).

Regarding claim 1, Melton et al. do not explicitly disclose an insertion robot to position optical components and the mating optical fibers. However, Melton et al. disclose the attachment of the ferrules to the optical fibers by aligning the ferrules with the mating optical fibers; thus, it would inherently possess the insertion tool.

Regarding claim 12, Melton et al. do not explicitly disclose a fiber gripper adapted to grip the fiber optic cable cladding and core. However, Melton et al. disclose the attachment of the ferrules to the optical fibers by aligning the ferrules with the mating optical fibers, which inherently would possess some sort of the fiber gripper.

Regarding claims 10 and 23, Melton disclose the apparatus wherein an epoxy curing is used to bond one or more of the plurality of optical components to the plurality of mating optical fibers (see [0045], lines 23-32).

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

6. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

7. Claims 4, 14, 15 and 17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Melton et al. (as cited above) in view of Robinson et al. (U.S. Patent 6,628,879).

Melton et al. disclose an optical device with all the limitations set forth in the claims as discussed above, except for the component attachment tool having a set of component holding recesses to hold and rotate one or more of the plurality of components. However, the component holding recesses are well known in the art as taught by Robinson et al. Robinson et al. teach the component holding recesses in column 6, line 19-20. Such an element would advantageously provide for holding and supporting the optical device. Therefore, it would have been obvious to one having

ordinary skill in the art at the time the invention was made to modify the Melton device with a holding recess. Doing so would be desirable to obtain a strong support for an optical device.

Allowable Subject Matter

8. Claims 2, 3, 5-9, 11, 13, 16, 19-22 and 24 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Claims 25-31 are allowed.

The prior art fails to disclose or reasonably suggest an optical component attachment comprising a fiber gripper having a plurality of insertion pinchers to grip and support the mating optical fibers as recited in claims 2 and 25; wherein the first component insertion is rotatably mounted to a moveable attachment as recited in claims 5 and 13; wherein the first set of the component holding recesses rotates between a component loading position and processing position as recited in claims 6 and 16; wherein the epoxy curing comprises a heater to heat and cure the epoxy as recited in claims 11 and 24; wherein aligning comprises rotating the plurality of optical components between a component loading position and attachment position as recited in claim 19; wherein prior to aligning, loading the plurality of optical components in a component attachment tool and then rotating them to about the component attachment position as recited in claim 20; the axial rotation as recited in claim 21; and further

inserting the optical components onto the cladding and core of the mating fiber as recited in claim 22.

Claims 3, 7-9 and 26-31 are dependent on the allowable claims 2, 6 and 25 respectively.

Conclusion

9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Ramakrishnan et al. (U.S. Patent 6,625,002) disclose optical component assemblies.

10. The prior art documents submitted by applicant in the Information Disclosure Statement filed on 02/25/2003, have all been considered and made of record (note the attached copy of form PTO-1449).

11. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jennifer Doan whose telephone number is (571) 272-2346. The examiner can normally be reached on Monday to Thursday from 6:00am to 3:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rodney Bovernick can be reached on (571) 272-2344. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0956.

Jennifer Doan

JD

January 5, 2004

Phan T. H. Palmer

PHAN T. H. PALMER
PRIMARY EXAMINER